Before the
FEDERAL COMMUNICATIONS COMMISSION
Washington, DC 20554

In re	)	
	)	
Telecommunications Relay Services and	)	CG Docket 03-123
Speech-to-Speech Services for Individuals	)	
with Hearing and Speech Disabilities	)	
	)	
To: The Commission	)	

REPLY TO COMMENTS ON NOTICE OF PROPOSED RULE MAKING

Hands On Video Relay Services, Inc. ("HOVRS"), by its counsel, replies to the Comments submitted to the Commission's November 30, 2005 Notice of Proposed Rulemaking, FCC 05-196. In support, the following is shown:

I. Introduction.

Providing access to emergency services through Internet relay services is essential to ensuring the ADA's mandate that the Commission provide functionally equivalent telephone service to deaf and hard of hearing individuals. The evidence of the shift of relay use to Internet relay services is overwhelming.[1] Deaf and hard of hearing individuals are abandoning their TTYs and are embracing IP relay and VRS in ever increasing numbers. For example, traditional interstate relay service minutes (including CapTel, which is increasing in use) declined from some 2.01 million minutes in December of 2004 to 1.79 million minutes in December of 2005. In that same time span, IP Relay minutes increased from 6.22 million minutes to 6.46 million minutes and VRS minutes

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[1]HOVRS will refer in these reply comments to both IP Relay Service ("IP Relay") and Video Relay Service ("VRS") as Internet relay services.

skyrocketed from 1.42 million minutes to 3.06 million minutes.[2] There is no reason to believe this trend will abate and every reason to believe it will continue.

As the comments in this proceeding demonstrate, delivering functionally equivalent emergency calling services to the deaf and hard of hearing population is fraught with difficult challenges. These challenges include: (1) the inherent limitations of the Internet, such as the lack of ability to transmit SS7 data and the use by Internet service providers of dynamic IP addresses; (2) competing policy considerations, such as the desire of relay users for anonymity; (3) the lack of integration between Internet relay services and the North American Numbering Plan ("NANP"); (4) the actions of providers, such as the blocking of consumer access to competing providers; (5) the scarcity of interpreters; (6) the Commission's inability to regulate equipment used by consumers to access relay services; and (7) the trend of Internet relay users toward mobility.

Based upon its review of the comments submitted in this proceeding and its experience as an Internet relay provider, Hands On discusses several recommendations below.

First, registration should be voluntary. However, the Commission should require relay providers to offer Internet relay users NANP numbers for the purpose of creating a uniform voluntary registration scheme which would help facilitate automatic call routing and location

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[2] *Compare TRS Fund Performance Status Report, Fund Status as of January 31, 2005 with TRS Fund Performance Status Report, Fund Status as of January 31, 2006,* available at http://www.neca.org/source/NECA_Resources_4285.asp. Figures for the eight month period (May to December, 2004 and 2005) are likewise. Interstate TRS minutes (which includes CapTel minutes) decreased from 16.15 million minutes to 12.5 million minutes. IP relay minutes on the other hand increased from 43.58 million minutes to 46.46 million minutes and VRS minutes increased from 8.69 million minutes to 18.47 million minutes. *Id.* Total minutes reimbursed by the Interstate TRS fund increased in this period from 69.5 million to 77.5 million minutes.

identification. These numbers should be administered from a central database independent of any provider and financed from the Interstate TRS fund.

Second, providers should be encouraged to interconnect their systems and to pool interpreting resources for emergency calls; the Commission should prohibit providers from using any artifice to prevent or hinder Internet relay users from using the services of any other provider.

Third, Internet relay providers should be required to have an emergency access link on their web sites, the functional equivalent of dialing 911, which would give users priority over all other non-emergency calls. Providers would be required to rout all such traffic to the appropriate PSAP and to no where else.

Fourth, the Commission should allow Internet relay providers to expense research and development costs related to emergency calling.

Fifth, mobile equipment provided to any deaf or hard of hearing person by a relay provider after December 31, 2007, for the purpose of Internet relay access should be equipped with a device which will automatically transmit to any relay service, the devices' coordinates if the 911 feature is activated. Moreover, the Commission should consider requiring any 3G wireless device to provide location information if used to place an emergency VoIP or relay call.

These steps will contribute toward the provision of functionally equivalent Internet relay emergency access, and will help protect the lives and property of deaf and hard of hearing persons.

II. Registration should be voluntary.

The essential problem in providing automatic routing of Internet relay emergency calls arises because Internet traffic lacks the SS7 data that digital telephone traffic carries.[3] The NPRM emphasized registration as a potential key element in solving the problem of Internet relay emergency access. NPRM at paras 19-24. Although HOVRS agrees with Sorenson that registration may be helpful and that providers should allow voluntary registration of users, HOVRS joins with the overwhelming weight of the comments to emphasize that any registration scheme must be voluntary due to the inherent limitations of a registration system. (Sorenson at 15; Sprint at 5-8; Hamilton at 3-4; Verizon Comments at 2; CSD at 12-14; CAC at 5-7; NAD at 2, 3).[4]

First, it is unlikely users will take the time to register with every provider. Yet, it is imperative that every provider be available to the user in the shortest period of time if in the need arises to make an emergency call. Internet relay users who are unable for any reason to access their preferred provider should not be faced with a registration screen when they need to make an emergency call. The precious seconds necessary to complete registration could be the difference between life and death.[5]

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[3]For a good discussion of the SS7 system, *see* http://www.pt.com/tutorials/ss7/.

[4]The New Jersey Ratepayer Advocate Division appears to be the only party supporting mandatory registration. Its comments, however, fail to discuss the inadequacies of a mandatory registration scheme discussed by the other commenting parties or the points made in this reply.

[5]It of course follows from this discussions that the Commission must prohibit provider blocking of consumer access to competing providers. Such a practice limits a user's ability to make an emergency call through an alternative provider should his preferred provider's service be unavailable because of an outage or because all available interpreters (or CAs) are on other calls. HOVRS implemented blocking on certain installed equipment as a competitively necessary response to Sorenson's blocking of its VP-100 video phone devices. HOVRS has never wavered from its position, however, that such blocking is contrary to the public interest. The fact that Sorenson has publicly stated that it will cease blocking effective July 1, 2006, is not a reason for the Commission

Second, Internet relay users have the capability to be mobile and thus may not be located at their registered locations when the need for an emergency call presents itself. Indeed, consumers can now access IP relay from a number of hand held wireless devices (*see, e,g,* http://www.goamerica.com/media_center/pr.php?action=view&article=259), and mobile VRS is also available via a lap-top computer equipped with a video camera and a wireless Internet interface, such as a Wi-Fi card. Smaller hand held devices with wireless bandwidth sufficient to access VRS will likely be commercially available very shortly. Therefore, registration is an unreliable means to automatically rout emergency relay calls.

Third, the deaf and hard of hearing community has historically opposed registration -- and for good reason.[6] Not only is the community concerned about privacy, but registration is contrary to functional equivalency. Persons calling from public phones are not required to register with the phone company. Likewise anyone can use a telephone without identifying himself to the telephone company. It is of course true that the telephone company has records of the subscriber to a phone line and VoIP providers have such records as to their subscribers as well. However, Internet relay service is not the functional equivalent of a telephone line, but rather of dial tone.

HOVRS agrees with CSD (at 9-12), Hamilton (at 2), Verizon (at 3-4) and CAC (at 4) that integration of Internet relay service with NANP would assist both a registration process and enhance

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to decline to prohibit blocking since nothing would stop other providers from implementing a future blocking scheme. The Commission should therefore adopt a rule prohibiting any scheme or artifice that has the result of blocking a relay provider's access to competing providers.

[6]The State of Missouri's Comments also raise valid concerns regarding the NPRM's suggestion of the use of registration as a proxy for jurisdictional separation of intrastate and interstate costs. Missouri correctly shows that this issue has no place in this proceeding, which is dedicated to determining how best ensure that deaf and hard of hearing persons have efficient access to emergency calling over Internet relay services.

emergency call access. Use of NANP numbers would facilitate the ability of the PSAP to call back a disconnected emergency caller. Moreover, giving Internet relay users the ability to call one another with real telephone numbers will encourage voluntary registration. The numbering scheme should be such that all relay providers will have access to an independent, central routing database so that a user may receive calls placed through any provider just as hearing persons can receive such calls. The cost of administering Internet relay numbers should be considered an interstate expense and charged to the Interstate TRS Fund. The use of fictitious numbers by Internet relay providers should be prohibited since their use would be inconsistent with NANP and confusing to consumers.

III. Priority access of emergency relay calls and interconnection of relay providers.

HOVRS agrees with the comments suggesting that emergency calls be given priority access. *See, e.g.*, Sorenson at 7-9. HOVRS suggests that each Internet relay provider be required to have an emergency ("911") link on its home page which would send an emergency call to the top of the provider's queue. However, HOVRS believes that the FCC should encourage – if not require – that providers interconnect their systems in order to allow emergency calls to be answered by the first available relay operator on duty with any provider. Thus, if a 911 call were not answered within say five seconds, the provider's platform would begin to search for other providers to take the call. The Commission has authority to require interconnection under Section 201(a) of the Communications Act where the public interest so warrants. This is a prime example of where the public interest so warrants. The provider 911 links should also contain an optional location entry form the user could quickly complete which would both flash on the interpreter's screen and which would automatically locate and contact the appropriate PSAP. To prevent abuse, the Commission should require that these relay 911 calls may only be routed to a PSAP.

Hands On also suggests that the Commission encourage the Internet relay industry to explore establishment of a separate organization to run one or more emergency call centers. These would be accessed through special Internet web sites such as www.911relay.com. Centralizing of emergency communications could have several benefits. Communication efficiencies could be achieved in terms of having medically trained interpreters or CAs who would be used to dealing with persons in stressful situations. Likewise cost savings could be achieved in only needing to offer a small corp of interpreters and CAs with such specialized training. Moreover, such an approach would avoid requiring each relay provider to undergo potentially costly reconfiguration of its platform to meet the emergency calling requirements.

IV. The Commission should allow research and development expenses relating to the handling of emergency calls as a reimbursable relay expense.

If continuing progress is to be made in improving Internet relay users' access to emergency calls, the Commission must allow relay providers to obtain reimbursement of reasonable research and development expenses relating to the handling of emergency traffic.[7] Otherwise there is no financial incentive for providers to improve emergency access to relay users. As is clear from the comments and the discussion above, there are serious impediments to the provision to relay users of the type of enhanced 911 service enjoyed by the vast majority of hearing telephone users. It is unreasonable for the Commission to expect providers to seek to solve these issues if they cannot

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[7] HOVRS has previously explained why reasonable research and development costs are a legitimate and proper element of relay rates. *See, e.g.*, HOVRS's Application for Review in Docket 98-67 (July 16, 2004) at n.16. Notwithstanding whether research and development costs are an appropriate rate element for relay generally, the need to solve outstanding issues in providing emergency access to relay callers makes this a compelling case to allow research and development costs to be reimbursable to providers.

recoup their reasonable costs of doing so. Research and experimentation in the market-place are at least as likely to generate solutions to these issues as Commission rule making proceedings.[8]

V. Mobile equipment supplied by relay providers should be required to provide location data by December 31, 2007.

As Internet relay becomes increasingly mobile, the problem of automatic PSAP routing will intensify. FCC Rule Section 20.18 sets forth the requirements of wireless service providers to be able to send location information to PSAPs. Wireless licensees may meet these requirements either through a network solution or a handset solution.[9] Neither of those alternatives are necessarily available to Internet relay providers since they neither control the wireless network nor necessarily the subscriber equipment.[10] Moreover, the FCC's jurisdiction over subscriber equipment used for relay is questionable since so much of that equipment is simply off the shelf consumer products. That being said, however, the Commission undoubtedly has jurisdiction over wireless equipment supplied to consumers to use for relay by virtue of its jurisdiction over relay providers. The Commission should therefore adopt a rule requiring wireless equipment distributed by Internet relay providers to deaf and hard of hearing persons to be equipped with a device which will automatically

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[8]Not only is individual provider research and development necessary, but all the players in the industry need to work together to resolve the serious technical problems to ensure full access to emergency calls by the deaf and hard of hearing community. Creative thinking, research and solutions are necessary which can best be accomplished by an industry/consumer working group.

[9]*See, e.g.*, Attachment 1 (discussing the Nokia 6015i GPS equipped PCS phone).

[10]However, the Commission should require wireless networks to allow relay providers access to their location resources to the extent technically feasible. HOVRS believes that all 3-G wireless devices should be equipped with a means of location identification -- such as GPS -- to facilitate 911 access if they are used for VoIP or relay communications. Moreover, consideration of how this issue is handled in other countries with more advanced 3-G wireless systems would be beneficial.

transmit to any relay service, the devices' coordinates when the 911 feature is activated.[11] This requirement should be effective after December 31, 2007, to give providers and equipment makers sufficient time to meet this requirement.

VI. Conclusion.

In conclusion, although registration should be voluntary, the Commission should require relay providers to offer NANP numbers for the purpose of creating a uniform voluntary registration scheme which would facilitate automatic call routing and location identification. These numbers should be administered from a central database independent of any provider and financed from the Interstate TRS Fund. Providers should also be strongly encouraged -- if not mandated -- to interconnect their systems and to pool interpreting resources for emergency calls.

In addition, relay providers should be required to have an emergency access link on their web sites, the functional equivalent of dialing 911, which would have priority over all other non-emergency calls. To avoid potential abuse, providers would be required to rout all such traffic to the appropriate PSAP and no where else. Moreover, the Commission should allow Internet relay providers to obtain reimbursement for their research and development efforts related to emergency calling. Finally, to address the trend toward mobility of relay users, mobile equipment provided after December 31, 2007, by a relay provider for the purpose of Internet relay access must be equipped with a device which will automatically transmit to any relay service, the devices' coordinates if the 911 feature is activated.

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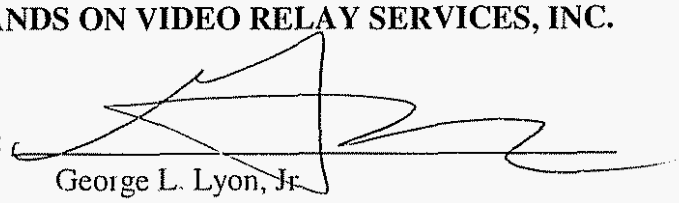
[11]In view of privacy concerns, this feature should only operate when the 911 feature is activated.

Taking these steps will continue the Commission's efforts toward the provision of functionally equivalent Internet relay emergency access, and will help protect the lives and property of deaf and hard of hearing persons.

Respectfully submitted,

HANDS ON VIDEO RELAY SERVICES, INC.

By: 

George L. Lyon, Jr.
Its Counsel

Lukas, Nace, Gutierrez & Sachs, Chartered
1650 Tyson's Blvd., Suite 1500
McLean, Virginia 22102
(703) 584-8664
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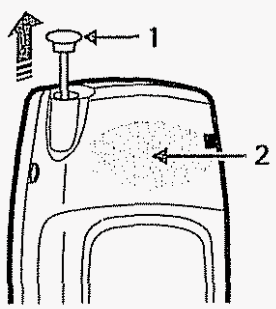
2. Set up your phone

Antenna

Your phone has two antennas:

- The retractable antenna is active when fully extended (1).
- The internal antenna is always active (2)

In the Nokia 6015i phone, the GPS antenna is also internal and is activated when placing emergency calls or when *On* is selected from the *Location info sharing* menu. For more information on location info sharing, see Location info sharing, 50.



Your device has an internal antenna located towards the top of the phone. Hold the phone as you would any other telephone with the antenna area pointed up and over your shoulder.

Note: As with any other radio transmitting device, do not touch the antenna unnecessarily when the device is switched on. Contact with the antenna affects call quality and may cause the phone to operate at a higher power level than otherwise needed. Avoiding contact with the antenna area when operating the phone optimizes the antenna performance and the battery life.